



CLEAN COPY OF PAGE 2 OF THE SPECIFICATION



automatically activated to illuminate the desired area at which the lamps are aimed. When the object leaves the viewing zone, the lamps automatically turn off after a pre-determined amount of time.

One problem with such controls is that the viewing angle of the sensor box is limited to approximately fifty (50) feet on both sides of the normal axis of the lens of the sensor box (110 degrees total). When the infrared emitting object approaches the light fixture from an angle outside the viewing zone, the lamps are not automatically activated.

U. S. Patent Nos. 5,418,368 and 5,453,622 disclose wide-angle motion detectors designed to extend the viewing zone greater than 180 degrees by using a plurality of inclined infrared mirror faces designed to direct sufficient intensity of radiation to the sensor from outlying angles. Such detectors use two or more infrared-reflecting faces which are positioned close to, and overlie at least a portion, of the sensor. The reflecting faces are configured so that their ends proximal to the sensor overlie the sensor at its midpoint and the faces extend from the mid-point in different directions away from one another to reflect radiation to the sensor from different sides of the sensor. Unfortunately, the lenses and reflective faces used on such detectors may become dirty or fogged over time, which reduces sensor operation

Another drawback with using wide-angle single detectors is that the user is unable to split the coverage area into smaller coverage areas. In some instances motion detectors are used in a long narrow environment, such as a walkway, where they are used to activate a floodlight, mounted on an adjacent wall, when an object enters the walkway from either end. Since an object may enter the walkway from either end, a wide-angle detector must be aimed